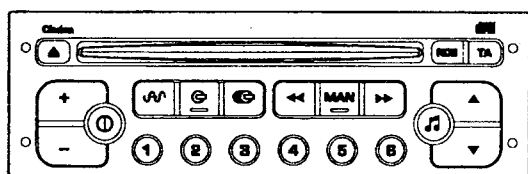
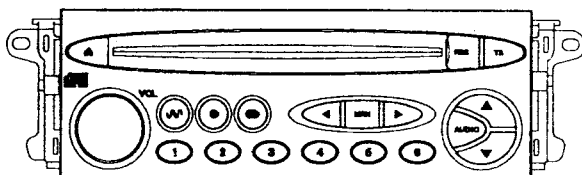


Service Manual

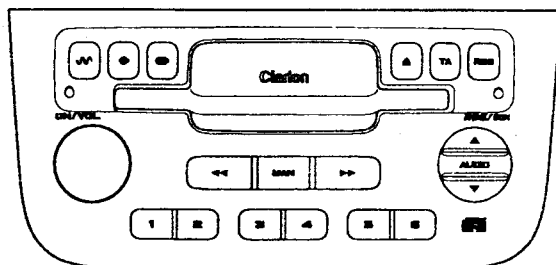
CLIENT : 2N CAR HI-FI CDE N° 218200
 DATE CDE : 20/09/02 VOTRE REF : ORDER E-04 MODE CDE : MINTEL
 REF. CDEE : DOC.PU2471/72/ REF. LIVR : DOC.PU2471/72/
 QTE CDEE : 1 QTE LIV : 1 RELQ : 0 1C11



PU-2471A



PU-2472A, B (WITH DUMMY COVER) / PU-2472C



PU-2473A, B

PEUGEOT/CITROEN
 Automobile Genuine
 RDS/FM/MW/LW Radio
 & CD Stereo Player

Model **PU-2471A-A**

Model **PU-2471A-B**

Model **PU-2471A-C**

Model **PU-2471A-D**

Model **PU-2471A-E**

Model **PU-2471A-F**

Model **PU-2472A-A**

Model **PU-2472B-A**

Model **PU-2472B-B**

Model **PU-2472C-A**

Model **PU-2472C-B**

Model **PU-2473A-A**

Model **PU-2473A-B**

SPECIFICATIONS

LW tuner section

Tuning system: PLL frequency synthesizer system
 Receive range: 153kHz to 279kHz
 Quieting sensitivity: Less than 43dB μ (at 20dB S/N)
 Auto tuning stop sensitivity:
 35 ± 10 dB μ (DX)
 62 ± 10 dB μ (LO)

MW tuner section

Tuning system: PLL frequency synthesizer system
 Receive range: 531kHz to 1,602kHz
 Quieting sensitivity: Less than 36dB μ (at 20dB S/N)
 Auto tuning stop sensitivity:
 35 ± 10 dB μ (DX)
 62 ± 10 dB μ (LO)

FM tuner section

Tuning system: PLL frequency synthesizer system
 Receive range: 87.5MHz to 108.0MHz
 Intermediate frequency: 10.7MHz
 Quieting sensitivity: Less than 13dB μ (at 30dB S/N)
 Separation: More than 20dB
 Auto tuning stop sensitivity:
 21 ± 8 dB μ (DX)
 47 ± 10 dB μ (LO)

CD player section

Separation: More than 65dB (1kHz)
 S/N ratio: More than 80dB (1kHz)
 Distortion: Less than 1.0% (1kHz)

General

Audio Power output: More than 10W \times 4
 Power supply voltage: DC13.5V Negative ground
 Current consumption: Less than 10A
 Dimensions(mm): 178(W) \times 50(H) \times 160(D)

※ Specifications and design are subject to change without notice for further improvement.

COMPONENTS

PU-2471A-A, A-B, A-C, A-D, A-E, A-F

/PU-2472A-A, B-A, B-B, C-A, C-B

/PU-2473A-A, A-B

Main unit

----- 1

NOTES

※ We cannot supply PWB with component parts in principle. When a circuit on PWB has failure, please repair it by component parts base. Parts which are not mentioned in service manual are not supplied.

※ Prevent damage caused by static electricity when repairing the pick-up.

The pattern of the pick-up is short-circuiting for prevention. Remove the soldering with a solder iron whose insulation resistance is larger than 10M Ω (DC500V) after complete connection to the main PWB. For repair

table shall use copper or conductive sheet (with impedance is lower to 100M Ω from 1M Ω) such as a sheet.

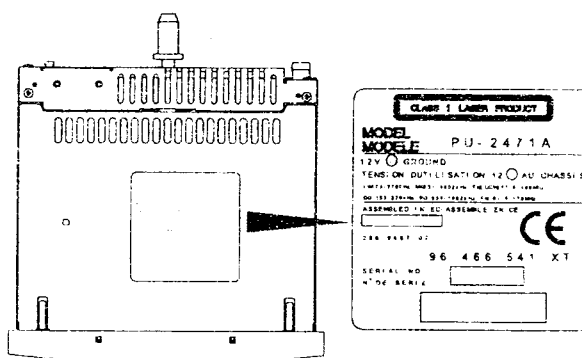
Be sure to put on a wrist-strap for prevent electric static's (with impedance is to 100M Ω from 1M Ω). The strap works to drain away the static electricity build-up on the human body.

And as static electricity build-up on clothes is not drained away, be careful and not your clothes to touch the pick-up.

Position of short soldering for pick-up protection position is different by model. Some units have two short soldering points. Always short LD circuit to open the short circuit and removes by soldering iron.

CAUTIONS

※ This appliance contains a laser system and is classified as a "CLASS 1 LASER PRODUCT". To use this model properly, read this Owner's Manual carefully and keep this manual for your future reference. In case of any trouble with this player, please contact your nearest "AUTHORIZED service station". To prevent direct exposure to the laser beam, do not try to open the enclosure.



■ To engineers in charge of repair or inspection of our products.

Before repair or inspection, make sure to follow the instructions so that customers and Engineers in charge of repair or inspection can avoid suffering any risk or injury.

1. Use specified parts.

The system uses parts with special safety features against fire and voltage. Use only parts with equivalent characteristics when replacing them.

The use of unspecified parts shall be regarded as remodeling for which we shall not be liable. The onus of product liability (PL) shall not be our responsibility in cases where an accident or failure is as a result of unspecified parts being used.

2. Place the parts and wiring back in their original positions after replacement or re-wiring.

For proper circuit construction, use of insulation tubes, bonding, gaps to PWB, etc, is involved. The wiring connection and routing to the PWB are specially planned using clamps to keep away from heated and high voltage parts. Ensure that they are placed back in their original positions after repair or inspection.

If extended damage is caused due to negligence during repair, the legal responsibility shall be with the repairing company.

3. Check for safety after repair.

Check that the screws, parts and wires are put back securely in their original position after repair. Ensure for safety reasons there is no possibility of secondary problems around the repaired spots.

If extended damage is caused due to negligence of repair, the legal responsibility shall be with the repairing company.

4. Caution in removal and making wiring connection to the parts for the automobile.

Disconnect the battery terminal after turning the ignition key off. If wrong wiring connections are made with the battery connected, a short circuit and/or fire may occur. If extensive damage is caused due to negligence of repair, the legal responsibility shall be with the repairing company.

5. Cautions regarding chips.

Do not reuse removed chips even when no abnormality is observed in their appearance. Always replace them with new ones. (The chip parts include resistors, capacitors, diodes, transistors, etc). The negative pole of tantalum capacitors is highly susceptible to heat, so use special care when replacing them and check the operation afterwards.

6. Cautions in handling flexible PWB

Before working with a soldering iron, make sure that the iron tip temperature is around 270°C. Take care not to apply the iron tip repeatedly (more than three times) to the same patterns. Also take care not to apply the tip with force.

7. Turn the unit OFF during disassembly and parts replacement. Recheck all work before you apply power to the unit.

8. Cautions in checking that the optical pickup lights up.

The laser is focused on the disc reflection surface through

the lens of the optical pickup. When checking that the laser optical diode lights up, keep your eyes more than 30cms away from the lens. Prolonged viewing of the laser within 30cms may damage your eyesight.

9. Cautions in handling the optical pickup

The laser diode of the optical pickup can be damaged by electrostatic charge caused by your clothes and body. Make sure to avoid electrostatic charges on your clothes or body, or discharge static electricity before handling the optical pickup.

9-1. Laser diode

The laser diode terminals are shorted for transportation in order to prevent electrostatic damage. After replacement, open the shorted circuit. When removing the pickup from the mechanism, short the terminals by soldering them to prevent this damage.

9-2. Actuator

The actuator has a powerful magnetic circuit. If a magnetic material is put close to it. Its characteristics will change. Ensure that no foreign substances enter through the ventilation slots in the cover.

9-3. Cleaning the lens

Dust on the optical lens affects performance. To clean the lens, apply a small amount of isopropyl alcohol to lens paper and wipe the lens gently.

EXPLANATION OF IC

052-1170-12 uPD784216BYGC-109-8EU

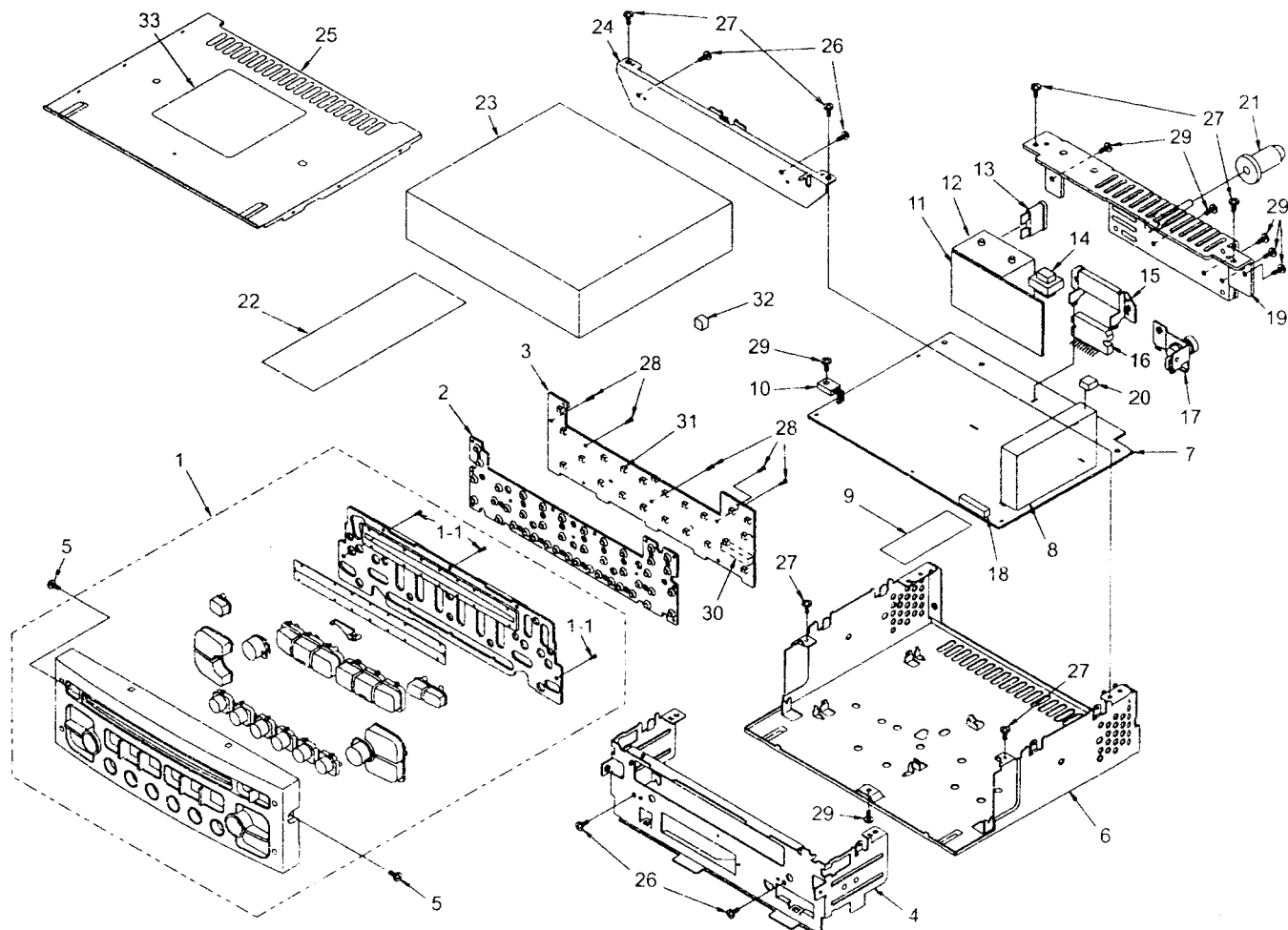
CD & Radio System
Controller

1. Terminal Description

pin 1: KI 1	IN: Key scan signal input.	pin 59: NU	- : Not in use.
pin 2: KI 2	IN: Key scan signal input.	pin 60: NU	- : Not in use.
pin 3: KI 3	IN: Key scan signal input.	pin 61: NU	- : Not in use.
pin 4: KI 4	IN: Key scan signal input.	pin 62: NU	- : Not in use.
pin 5: KI 5	IN: Key scan signal input.	pin 63: NU	- : Not in use.
pin 6: NU	- : Not in use.	pin 64: NU	- : Not in use.
pin 7: NU	- : Not in use.	pin 65: NU	- : Not in use.
pin 8: NU	- : Not in use.	pin 66: NU	- : Not in use.
pin 9: VDD	- : Positive supply voltage.	pin 67: NU	- : Not in use.
pin 10: X 2	- : Crystal connection.	pin 68: NU	- : Not in use.
pin 11: X 1	- : Crystal connection.	pin 69: NU	- : Not in use.
pin 12: VSS	- : Negative supply voltage.	pin 70: NU	- : Not in use.
pin 13: NU	- : Not in use.	pin 71: NU	- : Not in use.
pin 14: NU	- : Not in use.	pin 72: VSS	- : Negative supply voltage.
pin 15: RESET	IN: Reset signal input.	pin 73: NU	- : Not in use.
pin 16: SBSY	IN: Sub code sync input.	pin 74: CD CHO	O: CD check signal output.
pin 17: VAN INT	IN: The interrupt signal input from the VAN Bus.	pin 75: CD DET	IN: CD mechanism is connected = "H".
pin 18: KI 0	IN: Key scan signal input.	pin 76: No Exp	- : No explanation.
pin 19: RDS CLK	IN: RDS clock pulse input.	pin 77: No Exp	- : No explanation.
pin 20: RDS DATA	IN: RDS serial data input.	pin 78: No Exp	- : No explanation.
pin 21: BU DET	IN: Backup detection signal input.	pin 79: No Exp	- : No explanation.
pin 22: +VAN DET	IN: +VAN ON signal input.	pin 80: No Exp	- : No explanation.
pin 23: A VDD	- : Positive supply voltage for the Analog section.	pin 81: VDD	- : Positive supply voltage.
pin 24: A Vref	IN: Reference voltage for ADC.	pin 82: DIMMER CNT	O: Dimmer control signal output.
pin 25: NU	- : Not in use.	pin 83: No Exp	- : No explanation.
pin 26: FM S METER	IN: The input terminal of Internal A/D converter to monitor the radio field strength for FM.	pin 84: No Exp	- : No explanation.
pin 27: DIAG PAHAN	IN: Phantom circuit status input.	pin 85: No Exp	- : No explanation.
pin 28: NU	- : Not in use.	pin 86: No Exp	- : No explanation.
pin 29: IF BAND	IN: IF band width.	pin 87: No Exp	- : No explanation.
pin 30: NU	- : Not in use.	pin 88: No Exp	- : No explanation.
pin 31: NU	- : Not in use.	pin 89: No Exp	- : No explanation.
pin 32: MUTE DET	IN: The input terminal of the internal ADC for sensing the backup voltage.	pin 90: No Exp	- : No explanation.
pin 33: A VSS	- : Analog ground.	pin 91: No Exp	- : No explanation.
pin 34: NU	- : Not in use.	pin 92: VOLAI	IN: Volume control pulse input from the rotary encoder.
pin 35: NU	- : Not in use.	pin 93: VOLBI	IN: Volume control pulse input from the rotary encoder.
pin 36: A Vref	IN: Reference voltage for ADC.	pin 94: VPP	- : Connect to ground.
pin 37: MISO	IN: The serial data input from the VAN control IC.	pin 95: CD 5V ON	O: Power supply control signal output for the 5V power supply of the CD mechanism.
pin 38: MISIO	O: The serial data output to the VAN control IC.	pin 96: AM ON	O: AM ON flag output.
pin 39: SCLK	O: The clock pulse output to the VAN control IC.	pin 97: KO 0	O: Key scan output terminal.
pin 40: NU	- : Not in use.	pin 98: KO 1	O: Key scan output terminal.
pin 41: NU	- : Not in use.	pin 99: KO 2	O: Key scan output terminal.
pin 42: A MUTE	O: The audio mute signal output.	pin100: KO 3	O: Key scan output terminal.
pin 43: S SO	O: Slave chip select signal output.		
pin 44: BEEP	O: Beep out.		
pin 45: SDAT	O: The serial data output to the tuner pack.		
pin 46: VAN RESET	O: The reset pulse output to VAN control IC.		
pin 47: S CL 1	O: The clock pulse output for the tuner pack.		
pin 48: 12V SW	O: ON signal output to the external power supply.		
pin 49: 5V REM	O: ON signal output to the 5V power supply.		
pin 50: 14V REM	O: ON signal output to the 14V power supply.		
pin 51: +VAN ON	O: +VAN ON signal output.		
pin 52: VAN WU	O: The Wake up signal output to VAN-BUS-IC.		
pin 53: TEL MUTE	IN: Telephone mute command input.		
pin 54: CD 8V ON	O: ON signal output to the CD 8V power supply.		
pin 55: NU	- : Not in use.		
pin 56: S DA CO	O: The serial data output to the CASP IC.		
pin 57: S CLK CO	O: The clock pulse output to the CASP IC.		
pin 58: NU	- : Not in use.		

EXPLODED VIEW • PARTS LIST

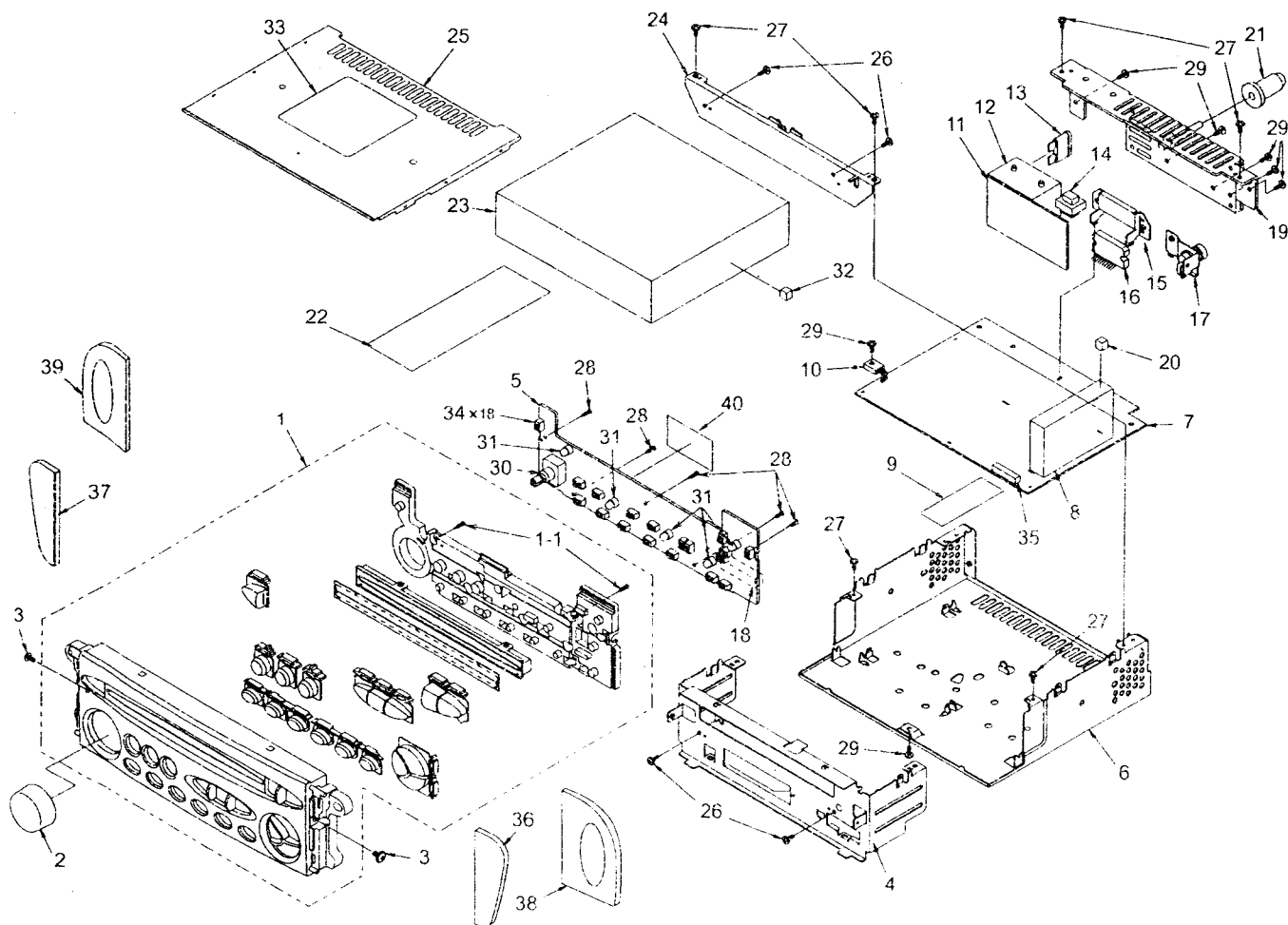
Main section : PU-2471A



NO.	PART NO.	DESCRIPTION	Q'TY
1	940-7915-61 940-7915-62 940-7915-63	ESCUTCHEON ASSY (2471A-A,A-D,A-E,A-F) ESCUTCHEON ASSY(2471A-C) ESCUTCHEON ASSY(2471A-B)	1
1-1	716-0778-10	WAVE SCREW	3
2	345-8532-00	RUBBER SWITCH	1
3	039-1806-00	SWITCH PWB (WITHOUT COMPONENT)	1
4	309-0759-10	FRONT PLATE	1
5	780-2605-00	IT IB SCREW(M2.6×5)	2
6	311-1808-01	LOWER CASE	1
7	039-2047-00	MAIN PWB (WITHOUT COMPONENT)	1
8	880-2088A	TUNER PACK(FM/MW/LW)	1
9	816-2525-01	FLAT WIRE	1
10	102-3420-00	TRANSISTOR(2SC3420)	1
11	039-1805-00	ISO PWB (WITHOUT COMPONENT)	1
12	074-1159-01	OUTLET SOCKET	1
13	060-0057-56	AUTO FUSE(10A)	1
14	009-9006-60	CHOKE	1
15	331-2574-00	IC HOLDER	1
16	051-2013-00	IC(TDA7385)	1
17	331-2989-00	ANT HOLDER	1

NO.	PART NO.	DESCRIPTION	Q'TY
18	074-1237-68	OUTLET SOCKET(18P)	1
19	313-1796-00	HEATSINK	1
20	345-8581-02	GASKET	1
21	345-4847-21	STOPPER	1
22	816-2564-01	FLAT WIRE	1
23	929-0220-80	CD MECHANISM	1
24	331-3377-00	MECHANISM BRACKET	1
25	310-1713-00	UPPER COVER	1
26	714-2603-81	MACHINE SCREW(M2.6×3)	4
27	731-2606-80	TAPTIGHT(M2.6×6)	6
28	716-0778-10	WAVE SCREW	5
29	714-2606-81	MACHINE SCREW(M2.6×6)	7
30	074-1228-68	OUTLET SOCKET(18P)	1
31	001-7053-90 001-7053-91	DIODE(2471A-A,A-B,A-C,A-E) DIODE(2471A-D,A-F)	22
32	345-8581-03	GASKET	1
33	286-9487-07 286-9487-08 286-9487-14 286-9487-21 286-9487-23 286-9487-24	SETPLATE(2471A-A) SETPLATE(2471A-B) SETPLATE(2471A-C) SETPLATE(2471A-D) SETPLATE(2471A-E) SETPLATE(2471A-F)	1

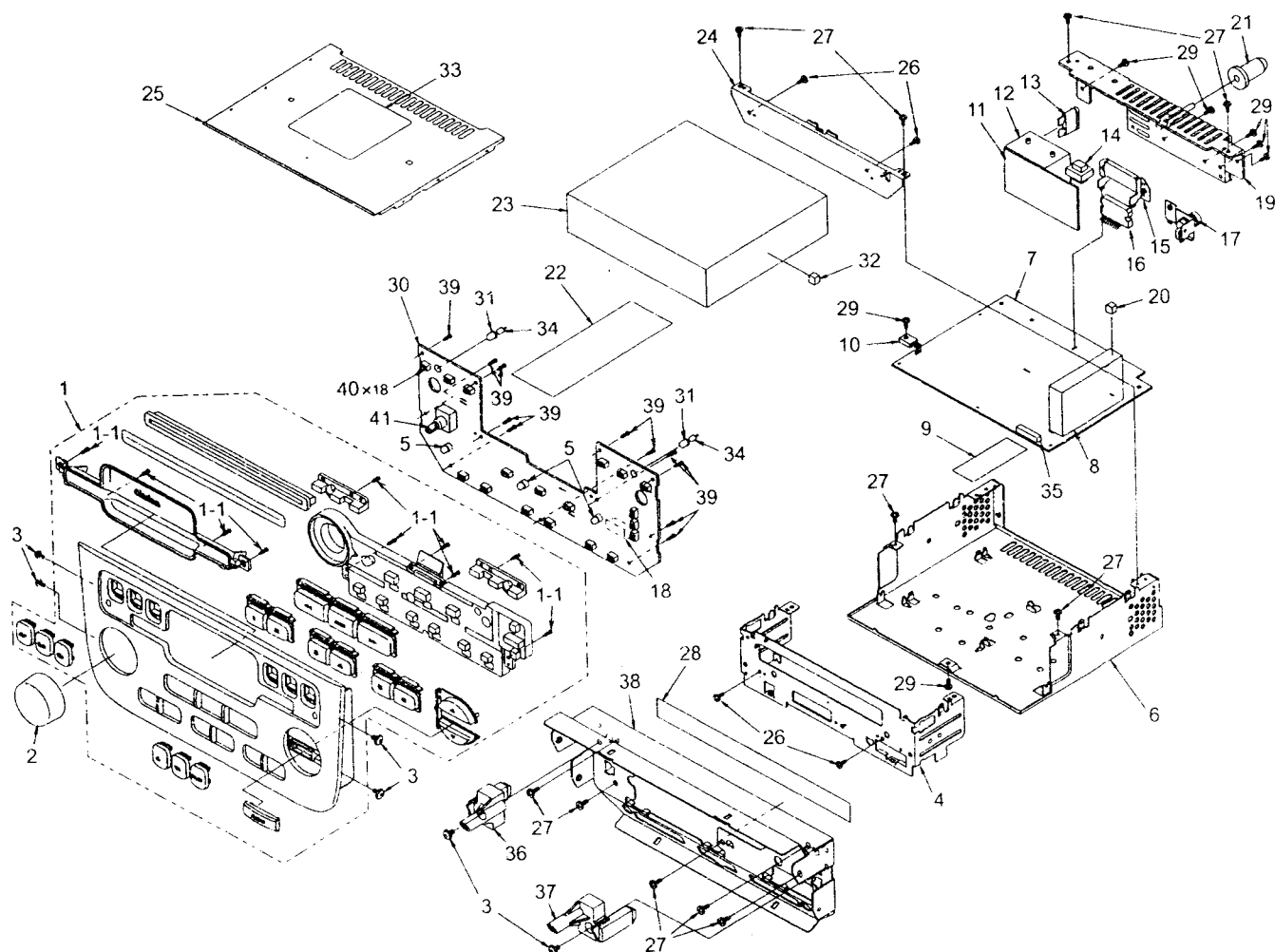
Main section : PU-2472A,B,C



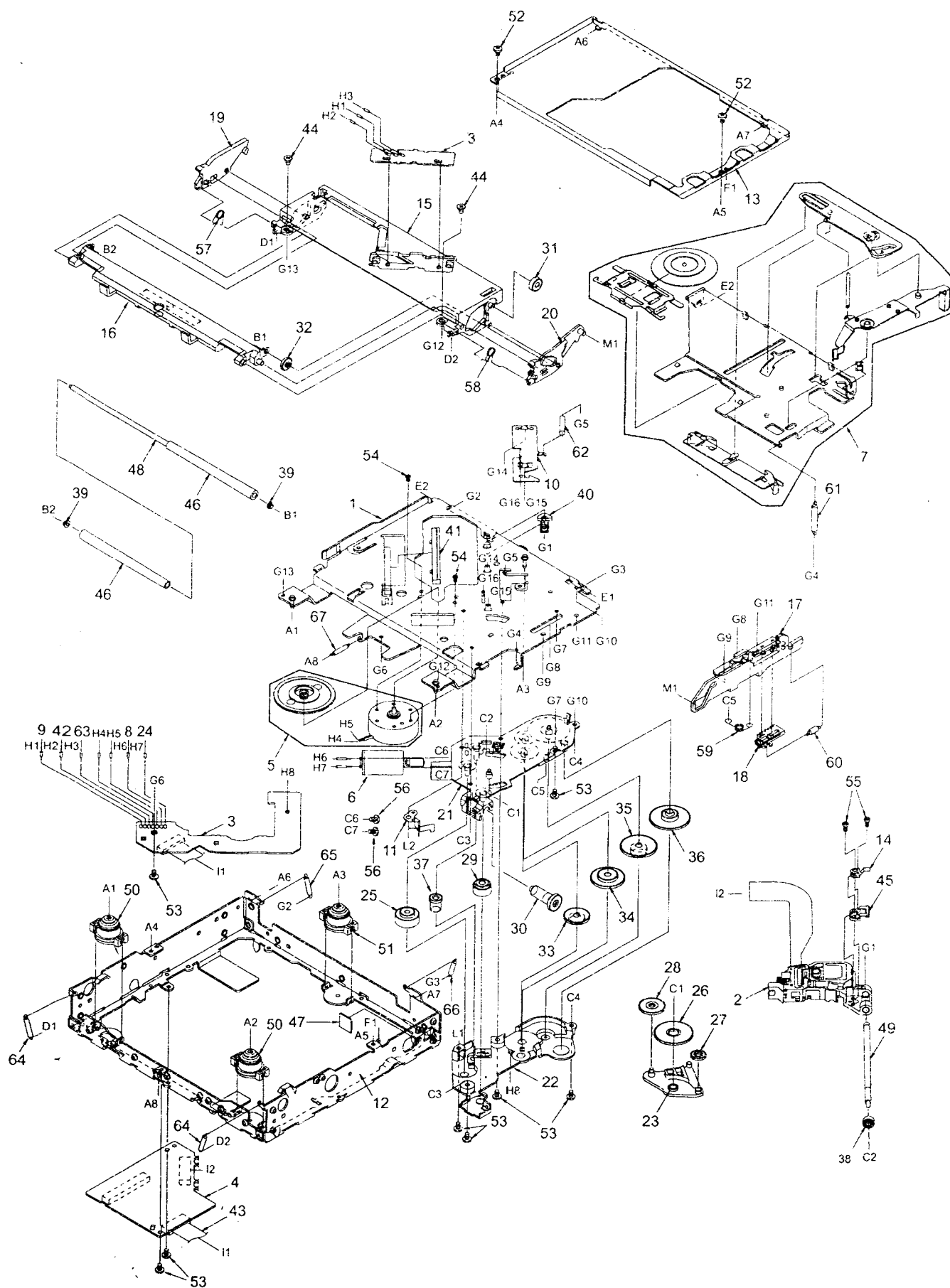
NO.	PART NO.	DESCRIPTION	Q'TY
1	940-7897-66 940-7897-73	ESCUTCHEON ASSY(2472A,C) ESCUTCHEON ASSY(2472B)	1
1-1	716-0778-00	WAVE SCREW	2
2	380-5439-11	KNOB	1
3	780-2605-00	IT IB SCREW(M2.6×5)	2
4	309-0774-10	FRONT PLATE	1
5	039-1936-00	SWITCH PWB (WITHOUT COMPONENT)	1
6	311-1808-11	LOWER CASE	1
7	039-2047-00	MAIN PWB (WITHOUT COMPONENT)	1
8	880-2088A	TUNER PACK(FM/MW/LW)	1
9	816-2525-01	FLAT WIRE	1
10	102-3420-00	TRANSISTOR(2SC3420)	1
11	039-1805-00	ISO PWB (WITHOUT COMPONENT)	1
12	074-1159-01	OUTLET SOCKET	1
13	060-0057-56	AUTO FUSE(10A)	1
14	009-9006-60	CHOKE	1
15	331-2574-00	IC HOLDER	1
16	051-2013-00	IC(TDA7385)	1
17	331-2989-00	ANT HOLDER	1
18	074-1228-68	OUTLET SOCKET(18P)	1
19	313-1796-00	HEATSINK	1
20	345-8581-02	GASKET	1

NO.	PART NO.	DESCRIPTION	Q'TY
21	345-4847-21	STOPPER	1
22	816-2564-01	FLAT WIRE	1
23	929-0220-80	CD MECHANISM	1
24	331-3377-00	MECHANISM BRACKET	1
25	310-1713-10	UPPER COVER	1
26	714-2603-81	MACHINE SCREW(M2.6×3)	4
27	731-2606-80	TAPTIGHT(M2.6×6)	6
28	716-0778-10	WAVE SCREW	5
29	714-2606-81	MACHINE SCREW(M2.6×6)	7
30	016-0010-16	ROTARY ENCODER	1
31	017-0454-02	PILOT LAMP(14V40mA)	5
32	345-8581-03	GASKET	1
33	286-9487-09 286-9487-10 286-9487-11 286-9487-25 286-9487-26	SETPLATE(2472A-A) SETPLATE(2472B-A) SETPLATE(2472C-A) SETPLATE(2472B-B) SETPLATE(2472C-B)	1
34	013-3741-11	SWITCH	1
35	074-1237-68	OUTLET SOCKET(18P)	1
36	335-5904-00	DUMMY COVER(2472A)	1
37	335-5905-00	DUMMY COVER(2472A)	1
38	335-6315-10	DUMMY COVER(2472B)	1
39	335-6316-10	DUMMY COVER(2472B)	1
40	345-5162-00	INSULATOR	1

Main section : PU-2473A



NO.	PART NO.	DESCRIPTION	QTY	NO.	PART NO.	DESCRIPTION	QTY
1	940-7869-65	ESCUTCHEON ASSY	1	21	345-4847-21	STOPPER	1
1-1	716-0778-00	WAVE SCREW	10	22	816-2564-01	FLAT WIRE	1
2	380-5430-01	KNOB	1	23	929-0220-80	CD MECHANISM	1
3	780-2605-00	IT IB SCREW(M2.6×5)	6	24	331-3377-00	MECHANISM BRACKET	1
4	309-0775-10	FRONT PLATE	1	25	310-1713-10	UPPER COVER	1
5	017-0454-00	PILOT LAMP(14V40mA)	3	26	714-2603-81	MACHINE SCREW(M2.6×3)	4
6	311-1808-21	LOWER CASE	1	27	731-2606-80	TAPTIGHT(M2.6×5)	11
7	039-2047-00	MAIN PWB (WITHOUT COMPONENT)	1	28	347-5925-00	HOLE COVER	1
8	880-2088A	TUNER PACK(FM/MW/LW)	1	29	714-2606-81	MACHINE SCREW(M2.6×6)	7
9	816-2525-01	FLAT WIRE	1	30	039-1937-00	SWITCH PWB (WITHOUT COMPONENT)	1
10	102-3420-00	TRANSISTOR(2SC3420)	1	31	345-3814-79	LAMP CAP	2
11	039-1805-00	ISO PWB (WITHOUT COMPONENT)	1	32	345-8581-03	GASKET	1
12	074-1159-01	OUTLET SOCKET	1	33	286-9487-12 286-9487-22	SETPLATE(2473A-A) SETPLATE(2473A-B)	1
13	060-0057-56	AUTO FUSE(10A)	1	34	017-0345-09	PILOT LAMP(14V40mA)	2
14	009-9006-60	CHOKE	1	35	074-1237-68	OUTLET SOCKET(18P)	1
15	331-2574-00	IC HOLDER	1	36	335-5750-01	MOUNTING MOLD	1
16	051-2013-00	IC(TDA7385)	1	37	335-5749-01	MOUNTING MOLD	1
17	331-2989-00	ANT HOLDER	1	38	309-0716-11	FRONT PLATE	1
18	074-1228-68	OUTLET SOCKET(18P)	1	39	716-0778-10	WAVE SCREW	11
19	313-1796-00	HEATSINK	1	40	013-3741-11	SWITCH	18
20	345-8581-02	GASKET	1	41	016-0010-12	ROTARY ENCODER	1



NO.	PART NO.	DESCRIPTION	Q'TY	NO.	PART NO.	DESCRIPTION	Q'TY
1	966-0595-24	DRIVE PLATE ASSY	1	34	621-0617-20	POWER GEAR B	1
2	969-0060-30	PICK UP UNIT	1	35	621-0618-20	POWER GEAR C	1
3	039-1944-21	LED PWB (WITHOUT COMPONENT)	1	36	621-0619-20	POWER GEAR D	1
4	039-1945-20	CD PWB (WITHOUT COMPONENT)	1	37	621-0620-20	THREAD GEAR A	1
5	SMA-182-100	MOTOR ASSY(SPINDLE)	1	38	621-0621-20	THREAD GEAR B	1
6	SMA-183-100	MOTOR ASSY(SLED)	1	39	621-0622-21	ROLLER SLEEVE	2
7	HBS-516-100	CLAMPER SUB ASSY	1	40	621-0623-21	LS-HOLDER	1
8	803-4906-60	VINYL COAT WIRE(ORG)	1	41	621-0624-21	GUIDE RAIL	1
9	816-2591-00	LEAD WIRE(YEL)	1	42	816-2593-00	LEAD WIRE(PUR)	1
10	620-1025-21	ID-LOCK PLATE	1	43	816-2542-01	FLAT WIRE(10P)	1
11	620-1026-21	SPRING PLATE	1	44	716-3473-00	SCREW	2
12	620-1027-24	LOWER CHASSIS	1	45	621-0628-21	SH-BASE	1
13	620-1028-21	UPPER CHASSIS	1	46	621-0629-20	LOADING ROLLER	2
14	620-1029-21	SH-SPRING	1	47	345-8704-20	CUSHION RUBBER	1
15	621-0598-25	UPPER GUIDE	1	48	622-1571-21	ROLLER SHAFT	1
16	621-0599-25	ROLLER GUIDE	1	49	624-0018-01	LEAD SCREW	1
17	621-0600-25	SHIFT LEVER	1	50	629-0081-20	DAMPER F	2
18	621-0601-21	RACK	1	51	629-0082-20	DAMPER R	1
19	621-0602-22	LOCK ARM L	1	52	714-2003-81	MACHINE SCREW	2
20	621-0603-23	LOCK ARM R	1	53	716-1507-00	SCREW	8
21	621-0604-21	GEAR BASE	1	54	716-1733-00	SCREW	2
22	621-0605-21	GEAR COVER	1	55	716-3469-00	SPECIAL SCREW	2
23	621-0606-21	IDLE CASE	1	56	716-3446-00	SCREW	2
24	816-2590-00	VINYL COAT WIRE(GRN)	1	57	750-3465-21	ROLLER SPRING L	1
25	621-0608-21	SECOND GEAR	1	58	750-3466-20	ROLLER SPRING R	1
26	621-0609-20	BASE GEAR	1	59	750-3467-21	SHIFT SPRING	1
27	621-0610-20	IDLE GEAR A	1	60	750-3468-20	RACK SPRING	1
28	621-0611-20	IDLE GEAR B	1	61	750-3469-20	CLAMPER SPRING	1
29	621-0612-21	ROLLER GEAR A	1	62	750-3470-20	ID-LOCK SPRING	1
30	621-0613-20	ROLLER GEAR B	1	63	816-2592-00	LEAD WIRE(BLU)	1
31	621-0614-20	ROLLER GEAR C	1	64	750-3472-21	DR-SPRING F	2
32	621-0615-21	ROLLER GEAR D	1	65	750-3473-20	DR-SPRING RA	1
33	621-0616-20	POWER GEAR A	1	66	750-3474-20	DR-SPRING RB	1
				67	750-3475-21	DR-SPRING C	1

■ ELECTRICAL PARTS LIST

Main PWB section(B1)

Note) Several different parts of the same reference number are alternative parts
One of those parts is used in the set.

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
BL51	880-2088A	AM/FM TUNER PACK	C146	168-1032-55	0.01 μ F	C220	178-2242-78	0.22 μ F
C1	183-1063-37	16V10 μ F	C201	166-3301-50	33pF CH	C221	178-2242-78	0.22 μ F
C2	168-3332-78	0.033 μ F	C202	168-1042-78	16V 0.1 μ F	C222	168-6822-55	6800pF
C3	168-1042-78	16V 0.1 μ F	C203	183-1063-37	16V10 μ F	C223	168-1032-55	0.01 μ F
C6	183-4763-17	6.3V47 μ F	C204	168-1022-55	1000pF	C224	178-3342-78	0.33 μ F
C51	168-1022-55	1000pF	C205	168-3322-55	3300pF	C225	168-3332-78	0.033 μ F
C56	168-2232-55	0.022 μ F	C206	168-3322-55	3300pF	C226	168-2722-55	2700pF
C57	166-1011-50	100pF CH	C207	168-2722-55	2700pF	C227	178-1542-78	0.15 μ F
C58	168-1032-55	0.01 μ F	C208	168-2722-55	2700pF	C228	178-2242-78	0.22 μ F
C59	168-1022-55	1000pF	C209	168-4722-55	4700pF	C229	178-2242-78	0.22 μ F
C60	168-1222-55	1200pF	C210	168-4722-55	4700pF	C230	183-2263-37	16V22 μ F
C61	166-1011-50	100pF CH	C211	168-1042-78	16V 0.1 μ F	C231	183-1053-67	50V1 μ F
C105	183-2253-67	50V2.2 μ F	C212	168-1032-55	0.01 μ F	C232	168-3312-55	330pF
C106	168-3312-55	330pF	C213	168-1042-78	16V 0.1 μ F	C233	183-2253-67	50V2.2 μ F
C107	168-5612-55	560pF	C214	168-6822-55	6800pF	C234	168-3312-55	330pF
C108	166-4701-50	47pF CH	C215	168-6822-55	6800pF	C235	183-1053-67	50V1 μ F
C109	166-5601-50	56pF CH	C216	168-1042-78	16V 0.1 μ F	C236	183-4743-67	50V0.47 μ F
C111	168-1042-78	16V 0.1 μ F	C217	168-2232-55	0.022 μ F	C237	183-4743-67	50V0.47 μ F
C113	183-4763-17	6.3V47 μ F	C218	168-4712-55	470pF	C238	183-4743-67	50V0.47 μ F
			C219	168-1032-55	0.01 μ F	C239	183-4743-67	50V0.47 μ F

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
C240	178-2242-78	0.22 μ F	CCT815	050-0140-54	1/32W 1k Ω \times 4J	R50	032-0140-04	1/10W 8.2k Ω
C241	178-2242-78	0.22 μ F	CCT816	050-0140-54	1/32W 1k Ω \times 4J	R51	032-0140-72	1/4W 470 Ω 1%
C242	168-1032-55	0.01 μ F	CCT817	050-0140-54	1/32W 1k Ω \times 4J	R106	119-1521-15	1/16W 1.5k Ω
C243	168-3332-78	0.033 μ F	D2	001-2404-90	MA28T-A	R107	119-1521-15	1/16W 1.5k Ω
C244	168-2722-55	2700pF	D50	001-0330-90	1SS119	R201	119-1041-15	1/16W 100k Ω
C245	178-1542-78	0.15 μ F	D301	001-0330-90	1SS119	R202	119-2241-15	1/16W 220k Ω
C247	168-1042-78	16V 0.1 μ F	D501	001-0330-90	1SS119	R203	119-8231-15	1/16W 82k Ω
C249	183-4763-37	16V47 μ F	D502	001-0330-90	1SS119	R204	119-4741-15	1/16W 470k Ω
C250	168-1042-78	16V 0.1 μ F	D503	001-0346-46	MTZJ9 1A	R205	119-6831-15	1/16W 68k Ω
C251	168-1042-78	16V 0.1 μ F	D504	001-0330-90	1SS119	R206	119-1041-15	1/16W 100k Ω
C252	183-4763-37	16V47 μ F	D505	001-0346-32	MTZJ5.6B	R207	119-2221-15	1/16W 2.2k Ω
C254	168-2732-55	16V 0.027 μ F	D507	001-0346-46	MTZJ9 1A	R210	119-4721-15	1/16W 4.7k Ω
C255	166-1811-50	180pF CH	D508	001-0330-90	1SS119	R211	119-8221-15	1/16W 8.2k Ω
C256	166-1811-50	180pF CH	D509	001-0346-48	MTZJ9 1C	R214	119-1021-15	1/16W 1k Ω
C301	183-1053-67	50V1 μ F	D510	001-0346-46	MTZJ9 1A	R215	119-1021-15	1/16W 1k Ω
C302	183-4763-37	16V47 μ F	D512	001-0330-90	1SS119	R216	119-1021-15	1/16W 1k Ω
C307	178-4742-78	0.47 μ F	D515	001-0330-90	1SS119	R217	119-1021-15	1/16W 1k Ω
C308	172-1041-15	0.1 μ F	D518	001-0466-90	S5688B	R218	119-2221-15	1/16W 2.2k Ω
C309	184-3383-32	16V3300 μ F	D523	001-0330-90	1SS119	R219	119-4721-15	1/16W 4.7k Ω
C310	183-4753-57	35V4.7 μ F	D530	001-0466-90	S5688B	R220	119-8221-15	1/16W 8.2k Ω
C401	166-4701-50	47pF CH	D701	001-0330-90	1SS119	R222	119-1241-15	1/16W 120k Ω
C402	166-4701-50	47pF CH	D702	001-0330-90	1SS119	R231	032-0140-50	1/16W 10k Ω 1%
C403	166-4701-50	47pF CH	D802	001-0330-90	1SS119	R232	032-0140-50	1/16W 10k Ω 1%
C404	166-5601-50	56pF CH	IC1	051-3047-90	LM7301MX	R233	032-0140-50	1/16W 10k Ω 1%
C405	166-3301-50	33pF CH	IC102	051-4607-90	SAA6581T	R234	032-0140-50	1/16W 10k Ω 1%
C406	042-0416-55	16V15 μ F TAN	IC201	051-5018-00	TEA6880H	R238	032-0140-50	1/16W 10k Ω 1%
C407	168-1032-55	0.01 μ F	IC301	051-2013-00	TDA7385	R301	119-1031-15	1/16W 10k Ω
C408	042-0452-82	16V100 μ F	IC401	051-6622-08	TSS463R	R302	119-1051-15	1/16W 1M Ω
C409	168-1042-78	16V 0.1 μ F	IC402	051-6610-18	MTC-30521	R303	119-1031-15	1/16W 10k Ω
C410	168-1032-55	0.01 μ F	IC501	051-3272-90	TDA3606AT	R401	119-4731-15	1/16W 47k Ω
C411	166-1511-50	150pF CH	IC800	052-1170-12	uPD784216BYGC-109-8EU	R402	119-4731-15	1/16W 47k Ω
C412	166-1511-50	150pF CH	J601	074-1228-76	26P	R403	119-4731-15	1/16W 47k Ω
C413	168-1042-78	16V 0.1 μ F	J602	074-1237-68	18P	R404	032-0140-50	1/16W 10k Ω 1%
C501	168-1042-78	16V 0.1 μ F	L1	010-8017-00	22mH	R405	111-4321-98	1/4W 4.3k Ω
C502	172-2241-15	0.22 μ F	L2	010-2230-68	4.7 μ H	R406	111-4321-98	1/4W 4.3k Ω
C503	168-1042-78	16V 0.1 μ F	L3	010-2003-04	COIL	R407	111-5101-98	1/4W 51 Ω
C504	183-1073-17	6.3V100 μ F	L50	010-2230-66	3.3 μ H	R408	111-5101-98	1/4W 51 Ω
C506	183-3353-67	50V3.3 μ F	L51	010-2230-84	100 μ H	R501	119-2231-15	1/16W 22k Ω
C507	183-1073-17	6.3V100 μ F	L201	010-2230-84	100 μ H	R502	119-4731-15	1/16W 47k Ω
C508	172-2241-15	0.22 μ F	L401	010-2230-60	1 μ H	R503	032-0140-03	1/16W 220k Ω \pm 1%
C509	042-0452-82	16V100 μ F	L402	010-2230-64	2.2 μ H	R504	119-2221-15	1/16W 2.2k Ω
C511	178-2242-78	0.22 μ F	Q1	198-0669-00	2SK669	R505	119-6821-15	1/16W 6.8k Ω
C512	042-0621-00	16V470 μ F	Q4	192-2712-00	2SC2712	R506	032-0140-97	1/10W 470k Ω 1%
C513	183-1073-27	10V100 μ F	Q5	193-1858-00	2SD1858	R507	111-1021-98	1/4W 1k Ω
C514	042-0452-81	10V220 μ F	Q50	125-9007-90	HN1C01F	R511	119-1021-15	1/16W 1k Ω
C515	168-1042-78	16V 0.1 μ F	Q106	125-0002-96	RN2406	R512	111-2211-98	1/4W 220 Ω
C516	042-0427-94	16V47 μ F TAN	Q301	192-2712-00	2SC2712	R514	119-1031-15	1/16W 10k Ω
C517	168-1032-55	0.01 μ F	Q302	125-2004-92	RN1402	R515	119-1031-15	1/16W 10k Ω
C519	172-1031-15	0.01 μ F	Q401	192-2712-00	2SC2712	R517	111-1811-88	1/2W 180 Ω
C520	183-1063-57	35V10 μ F	Q402	125-2004-96	RN1406	R518	111-1521-98	1/4W 1.5k Ω
C521	042-0621-00	16V470 μ F	Q501	192-2712-00	2SC2712	R519	119-1031-15	1/16W 10k Ω
C561	168-4732-78	0.047 μ F	Q502	125-0002-92	RN2402	R523	111-2211-88	1/2W 220 Ω
C562	168-1032-55	0.01 μ F	Q503	193-1664-00	2SD1664P,Q,R	R526	111-1521-98	1/4W 1.5k Ω
C601	042-0505-84	10V33 μ F	Q505	125-0002-92	RN2402	R527	119-1021-15	1/16W 1k Ω
C801	168-6832-78	0.068 μ F	Q507	190-1162-00	2SA1162	R528	119-1031-15	1/16W 10k Ω
C802	183-2263-17	6.3V22 μ F	Q508	102-3420-00	2SC3420	R532	119-4721-15	1/16W 4.7k Ω
C803	168-6832-78	0.068 μ F	Q509	190-1162-00	2SA1162	R533	111-1821-98	1/4W 1.8k Ω
C804	183-1073-17	6.3V100 μ F	Q510	125-2004-92	RN1402	R534	119-1031-15	1/16W 10k Ω
C805	166-1501-50	15pF CH	Q511	190-1298-00	2SA1298	R535	119-1031-15	1/16W 10k Ω
C806	166-1501-50	15pF CH	Q512	125-2004-92	RN1402	R543	111-6891-98	1/4W 6.8 Ω
C811	168-1532-55	0.015 μ F	Q513	193-2118-00	2SD2118	R544	114-2291-18	1W 2.2 Ω
C812	168-1032-55	0.01 μ F	Q516	190-1298-00	2SA1298	R550	119-1031-15	1/16W 10k Ω
CCT801	050-0140-54	1/32W 1k Ω \times 4J	Q517	125-2004-92	RN1402	R551	119-4721-15	1/16W 4.7k Ω
CCT802	050-0140-54	1/32W 1k Ω \times 4J	Q518	192-2458-00	2SC2458	R557	119-1021-15	1/16W 1k Ω
CCT803	050-0140-54	1/32W 1k Ω \times 4J	Q522	125-2004-92	RN1402	R562	119-3341-15	1/16W 330k Ω
CCT804	050-0140-54	1/32W 1k Ω \times 4J	Q523	190-1162-00	2SA1162	R563	119-1041-15	1/16W 100k Ω
CCT805	050-0140-54	1/32W 1k Ω \times 4J	Q524	125-2004-92	RN1402	R601	119-1031-15	1/16W 10k Ω
CCT807	050-0140-54	1/32W 1k Ω \times 4J	Q526	190-1431-00	2SA1431	R602	119-1031-15	1/16W 10k Ω
CCT808	050-0140-54	1/32W 1k Ω \times 4J	R1	032-0140-72	1/4W 470 Ω 1%	R801	119-1041-15	1/16W 100k Ω
CCT809	050-0140-54	1/32W 1k Ω \times 4J	R2	032-0140-01	1/10W 10 Ω	R802	119-1041-15	1/16W 100k Ω
CCT810	050-0140-54	1/32W 1k Ω \times 4J	R3	032-0140-01	1/10W 10 Ω	R803	119-4731-15	1/16W 47k Ω
CCT811	050-0140-54	1/32W 1k Ω \times 4J	R6	119-3301-15	1/16W 33 Ω	R804	119-4731-15	1/16W 47k Ω
CCT813	050-0140-54	1/32W 1k Ω \times 4J	R7	111-2221-98	1/4W 2.2k Ω	R805	119-4721-15	1/16W 4.7k Ω
CCT814	050-0140-54	1/32W 1k Ω \times 4J				R806	119-4721-15	1/16W 4.7k Ω

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
R807	119-1021-15	1/16W 1k Ω	R813	119-1031-15	1/16W 10k Ω	R824	119-1231-15	1/16W 12k Ω
R808	119-1031-15	1/16W 10k Ω	R815	119-1031-15	1/16W 10k Ω	SUP1	060-0122-91	DSP-141N-S00B
R809	119-1031-15	1/16W 10k Ω	R819	119-1031-15	1/16W 10k Ω	TH501	002-0303-90	6.8 Ω
R810	119-2231-15	1/16W 22k Ω	R820	119-1031-15	1/16W 10k Ω	X100	061-3013-90	4.332MHz
R811	119-1031-15	1/16W 10k Ω	R821	119-1031-15	1/16W 10k Ω	X401	061-3031-90	4.000MHz
R812	119-1031-15	1/16W 10k Ω	R822	119-1031-15	1/16W 10k Ω	X801	061-1081-90	12MHz

Switch PWB section(B2) : PU-2471A

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
D1	001-7053-90	LED orange	D17	001-7053-90	LED orange	R9	032-0104-50	1/4W 560 Ω (2471A-D,A-F)
D2	001-7053-90	LED orange	D18	001-7053-90	LED orange	R10	032-0104-50	1/4W 560 Ω
D3	001-7053-90	LED orange	D19	001-7053-90	LED orange	R11	032-0104-50	1/4W 560 Ω (2471A-D,A-F)
D4	001-7053-90	LED orange	D20	001-7053-90	LED orange	R12	032-0104-50	1/4W 560 Ω
D5	001-7053-90	LED orange	D21	001-7053-90	LED orange	R13	032-0104-50	1/4W 560 Ω (2471A-D,A-F)
D6	001-7053-90	LED orange	D22	001-7053-90	LED orange	R14	117-0000-05	1/10W 0 Ω JW
D7	001-7053-90	LED orange	P101	074-1228-68	18P	R15	117-1221-15	1/10W 1.2k Ω (2471A-A,A-B, A-C,A-E)
D8	001-7053-90	LED orange	R1	032-0104-69	1/4W 1.5k Ω (2471A-D,A-F)			
D9	001-7053-90	LED orange	R4	032-0104-50	1/4W 560 Ω			
D10	001-7053-90	LED orange	R5	032-0104-50	1/4W 560 Ω (2471A-D,A-F)			
D11	001-7053-90	LED orange	R6	032-0104-50	1/4W 560 Ω			
D12	001-7053-90	LED orange	R7	032-0104-50	1/4W 560 Ω (2471A-D,A-F)			
D13	001-7053-90	LED orange	R8	032-0104-50	1/4W 560 Ω			
D14	001-7053-90	LED orange						
D15	001-7053-90	LED orange						
D16	001-7053-90	LED orange						

Switch PWB section(B2) : PU-2472 / PU-2473

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
J101	074-1228-68	18P	S101	013-3741-11	SKQCAE	S112	013-3741-11	SKQCAE
PL101	017-0454-02	14V40mA(PU-2472)	S102	013-3741-11	SKQCAE	S113	013-3741-11	SKQCAE
PL101	017-0345-09	14V40mA(PU-2473)	S103	013-3741-11	SKQCAE	S114	013-3741-11	SKQCAE
PL102	017-0454-02	14V40mA(PU-2472)	S104	013-3741-11	SKQCAE	S115	013-3741-11	SKQCAE
PL102	017-0454-00	14V40mA(PU-2473)	S105	013-3741-11	SKQCAE	S116	013-3741-11	SKQCAE
PL103	017-0454-02	14V40mA(PU-2472)	S106	013-3741-11	SKQCAE	S117	013-3741-11	SKQCAE
PL103	017-0454-00	14V40mA(PU-2473)	S107	013-3741-11	SKQCAE	S118	013-3741-11	SKQCAE
PL104	017-0454-02	14V40mA(PU-2472)	S108	013-3741-11	SKQCAE	VR101	016-0010-16	VR(PU-2472)
PL104	017-0454-00	14V40mA(PU-2473)	S109	013-3741-11	SKQCAE	VR101	016-0010-12	VR(PU-2473)
PL105	017-0454-02	14V40mA(PU-2472)	S110	013-3741-11	SKQCAE			
PL105	017-0345-09	14V40mA(PU-2473)	S111	013-3741-11	SKQCAE			

ISO PWB section(B3)

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
D1	001-0334-30	RL202	J1	074-1159-01	ISO CONNECTOR	P2	076-0324-14	14P
F1	060-0057-56	AUTO FUSE 10A	P1	076-0324-10	10P	T1	009-9006-60	CH0KE COIL

CD PWB section(B4) : CD mechanism

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
C101	168-1042-78	0.1 μ F	C123	046-1032-78	0.01 μ F	C301	163-1073-35	16V100 μ F
C102	045-4701-50	47pF	C124	163-1073-05	4V100 μ F	C302	168-1042-78	0.1 μ F
C103	046-4722-58	4700pF	C125	168-1042-78	0.1 μ F	C303	043-0533-50	0.047 μ F
C104	168-1042-78	0.1 μ F	C126	168-1042-78	0.1 μ F	D201	001-0516-90	MA111
C105	046-1532-78	0.015 μ F	C129	178-1052-78	1 μ F	IC101	051-6376-00	TC94A14FA
C106	046-1032-78	0.01 μ F	C201	163-3363-05	4V33 μ F	IC102	051-3279-90	BA033LBSG
C107	046-1032-78	0.01 μ F	C202	168-1042-78	0.1 μ F	IC201	051-5710-90	TA2157F
C108	046-4722-58	4700pF	C203	178-1052-78	1 μ F	IC301	051-6049-08	BA5983FP-E2
C109	046-1522-58	1500pF	C204	163-1073-05	4V100 μ F	J101	074-1228-76	26P
C110	046-3332-78	0.033 μ F	C205	163-3363-05	4V33 μ F	J201	074-1138-65	15P
C111	168-1042-78	0.1 μ F	C206	168-1042-78	0.1 μ F	J301	074-1138-60	10P
C112	046-3332-78	0.033 μ F	C207	043-0533-50	0.047 μ F	L101	010-2285-57	BLM21B102SPT
C113	168-1042-78	0.1 μ F	C208	046-6822-58	6800pF	L102	010-2285-57	BLM21B102SPT
C114	168-1042-78	0.1 μ F	C209	168-1042-78	0.1 μ F	L103	010-2285-57	BLM21B102SPT
C115	046-4712-58	470pF	C210	043-0533-50	0.047 μ F	L104	010-2285-57	BLM21B102SPT
C116	046-4712-58	470pF	C211	168-1042-78	0.1 μ F	L105	010-2285-57	BLM21B102SPT
C117	043-0533-50	0.047 μ F	C212	168-1042-78	0.1 μ F	L401	010-2155-93	10 μ H
C118	043-0533-50	0.047 μ F	C213	045-5096-50	5pF	L401	010-3050-93	10 μ H
C119	045-2701-50	27pF	C214	045-5601-50	56pF	Q201	131-1188-50	2SB1188
C120	045-1801-50	18pF	C215	043-0533-50	0.047 μ F	R102	033-5621-15	1/16W 5.6k Ω
C121	163-1063-35	16V10 μ F	C216	178-1052-78	1 μ F	R104	033-4731-15	1/16W 47k Ω
C122	178-1052-78	1 μ F	C217	045-1011-50	100pF	R105	033-1041-15	1/16W 100k Ω

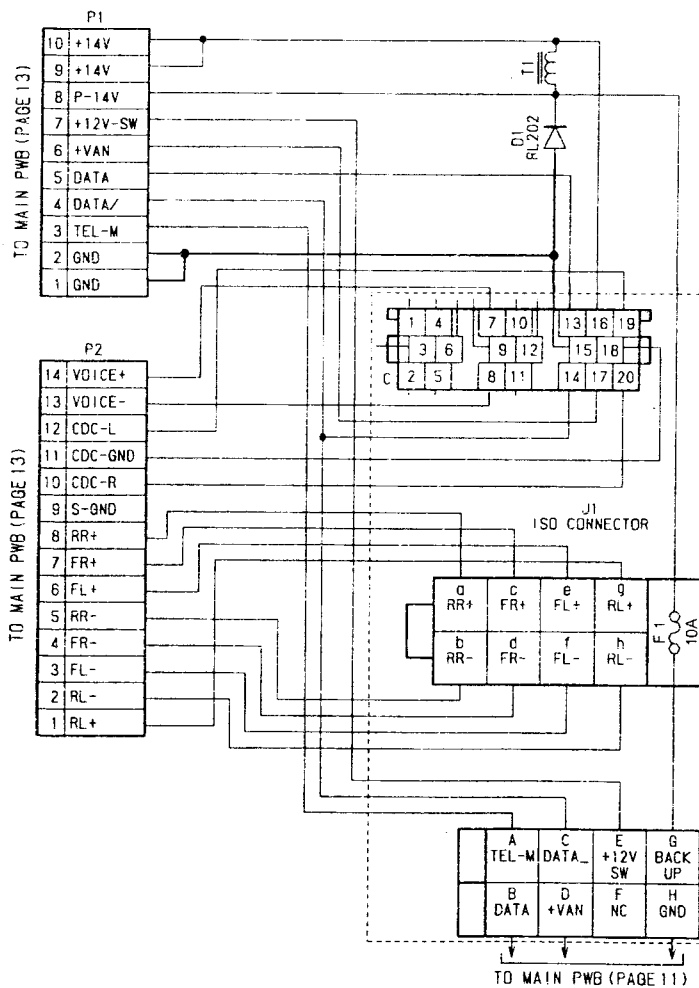
REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
R108	033-1531-15	1/16W 15kΩ	R202	117-2201-15	1/10W 22Ω	R213	033-1011-15	1/16W 100Ω
R109	033-1031-15	1/16W 10kΩ	R203	033-1041-15	1/16W 100kΩ	R214	033-1021-15	1/16W 1kΩ
R110	033-1051-15	1/16W 1MΩ	R204	033-1041-15	1/16W 100kΩ	R215	033-1031-15	1/16W 10kΩ
R111	033-3321-15	1/16W 3.3kΩ	R205	033-1041-15	1/16W 100kΩ	R217	033-1041-15	1/16W 100kΩ
R114	033-2211-15	1/16W 220Ω	R206	033-1041-15	1/16W 100kΩ	R218	033-2211-15	1/16W 220Ω
R115	033-2211-15	1/16W 220Ω	R207	033-1041-15	1/16W 100kΩ	R301	117-6811-15	1/16W 680Ω
R116	033-1031-15	1/16W 10kΩ	R208	033-8231-15	1/16W 82kΩ	R304	033-3921-15	1/16W 3.9kΩ
R117	033-1021-15	1/16W 1kΩ	R209	033-6811-15	1/16W 680Ω	R305	033-3921-15	1/16W 3.9kΩ
R131	033-4711-15	1/16W 470Ω	R210	033-6831-15	1/16W 68kΩ	R306	033-1041-15	1/16W 100kΩ
R132	033-2211-15	1/16W 220Ω	R211	033-1831-15	1/16W 18kΩ	R307	033-2211-15	1/16W 220Ω
R201	117-2201-15	1/10W 22Ω	R212	033-2721-15	1/16W 2.7kΩ	X102	060-1528-90	16.934M

LED PWB section(B5) : CD mechanism

REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION	REF No.	PART No.	DESCRIPTION
D1	001-7058-90	AN1105W-RR	Q1	060-4015-90	PS1192H	S1	013-7414-50	CHUCKING
D2	001-7058-90	AN1105W-RR	Q2	060-4015-90	PS1192H	S2	013-7413-50	LIMIT
J1	074-1138-60	10P						

CIRCUIT DIAGRAM

ISO PWB section(B3)



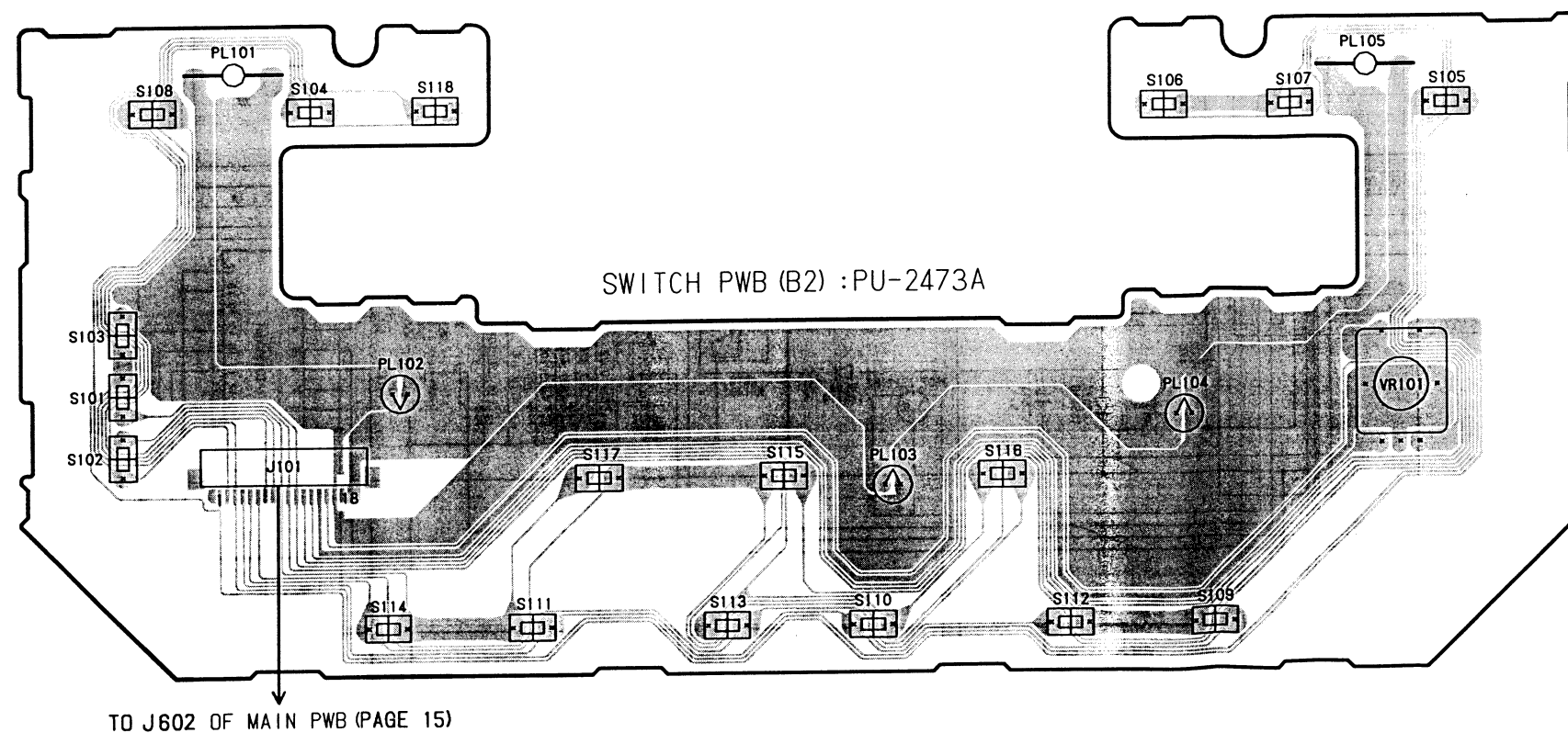
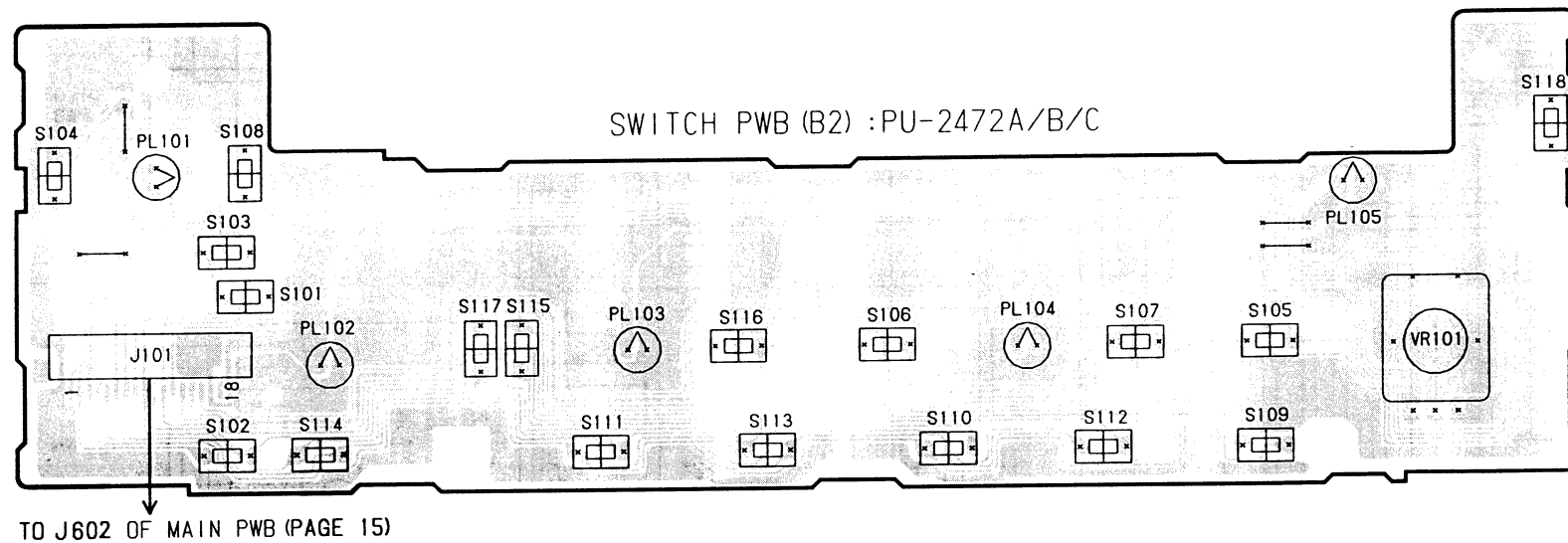
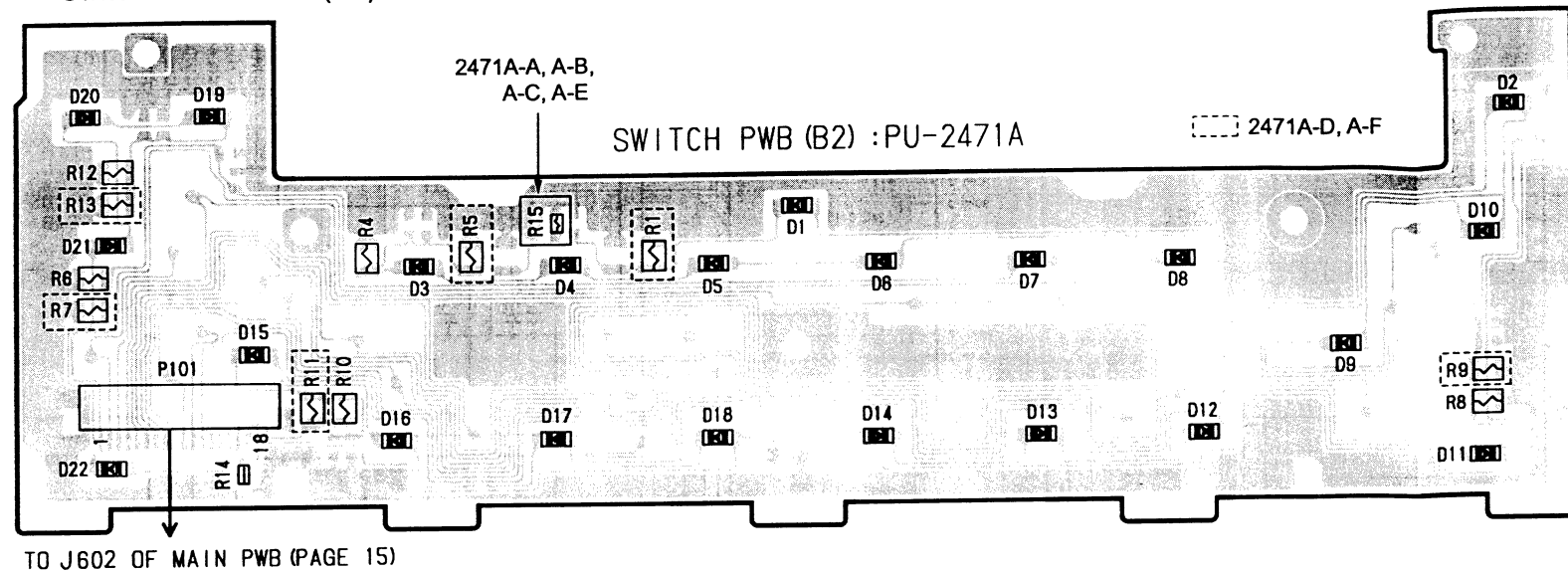
No.	Description
1	N.C.
2	N.C.
3	N.C.
4	N.C.
5	N.C.
6	N.C.
7	VOICE SYN(+)
8	VOICE SYN(-)
9	N.C.
10	N.C.
11	N.C.
12	N.C.
13	VAN DATA
14	VAN DATA/
15	CD A/C GND
16	CD A/C B/U
17	+VAN
18	CD A/C S-GND
19	CD A/C L
20	CD A/C R

No.	Description
a	REAR SP R-CH(+)
b	REAR SP R-CH(-)
c	FRONT SP R-CH(+)
d	FRONT SP R-CH(-)
e	FRONT SP L-CH(+)
f	FRONT SP L-CH(-)
g	REAR SP L-CH(+)
h	REAR SP L-CH(-)

No.	Description
A	TEL MUTE
B	DATA
C	DATA/
D	+VAN
E	+12V SW
F	N.C.
G	BACK UP
H	GND

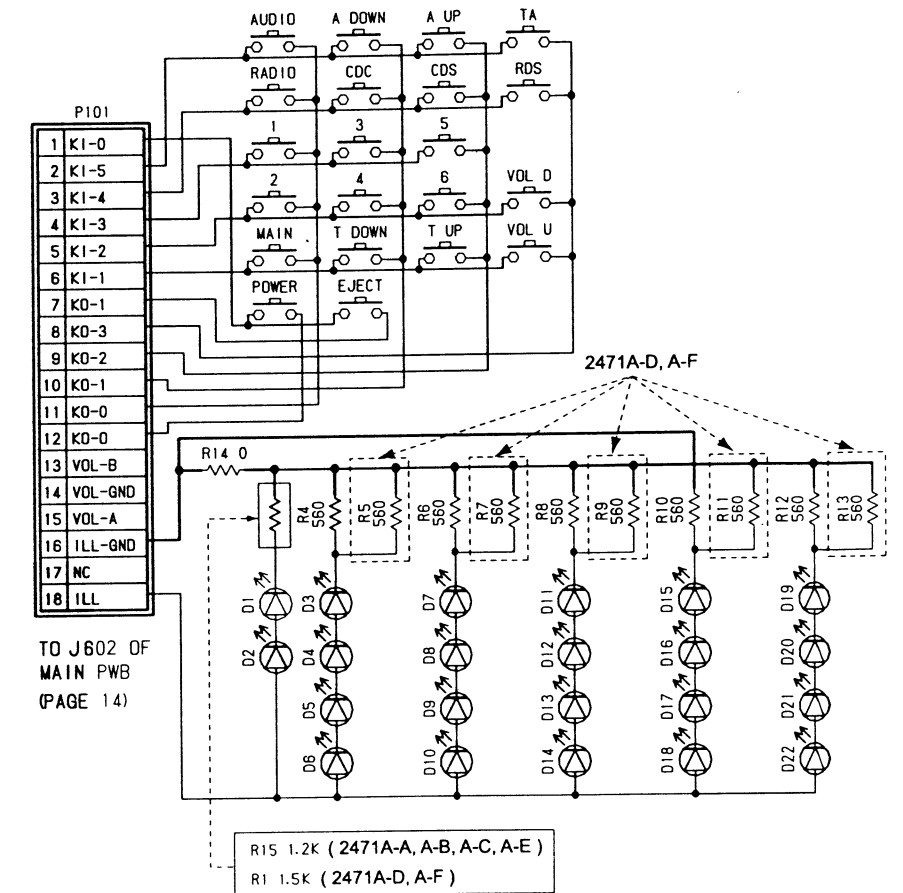
PRINTED WIRING BOARD

Switch PWB section(B2)

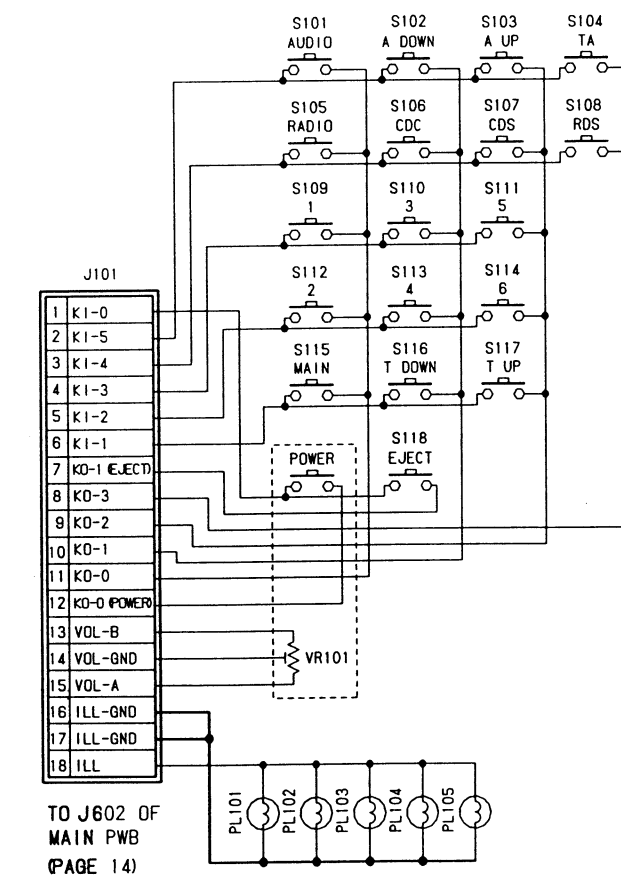


CIRCUIT DIAGRAM

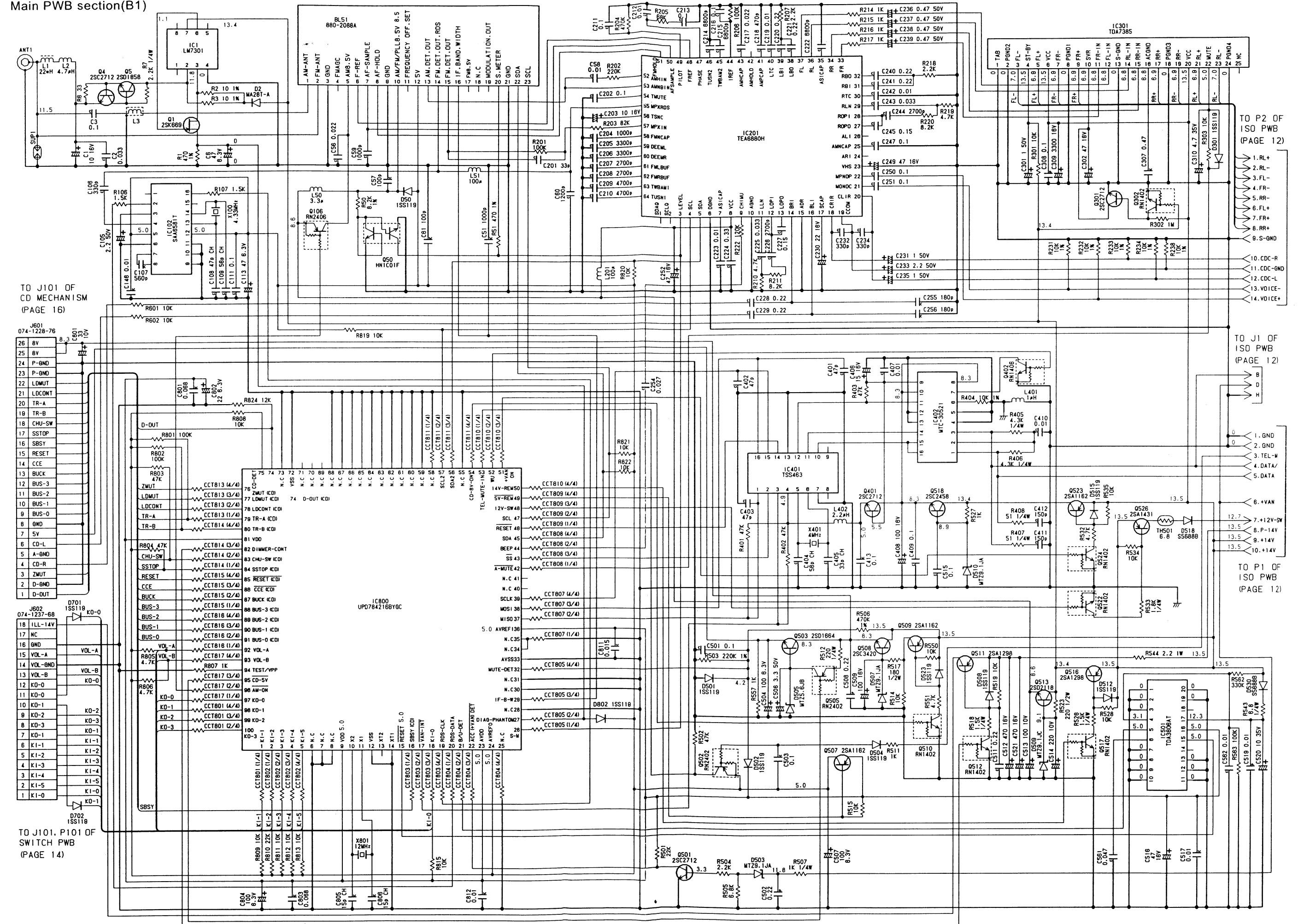
Switch PWB section(B2) : PU-2471A



Switch PWB section(B2) : PU-2472 / PU-2473

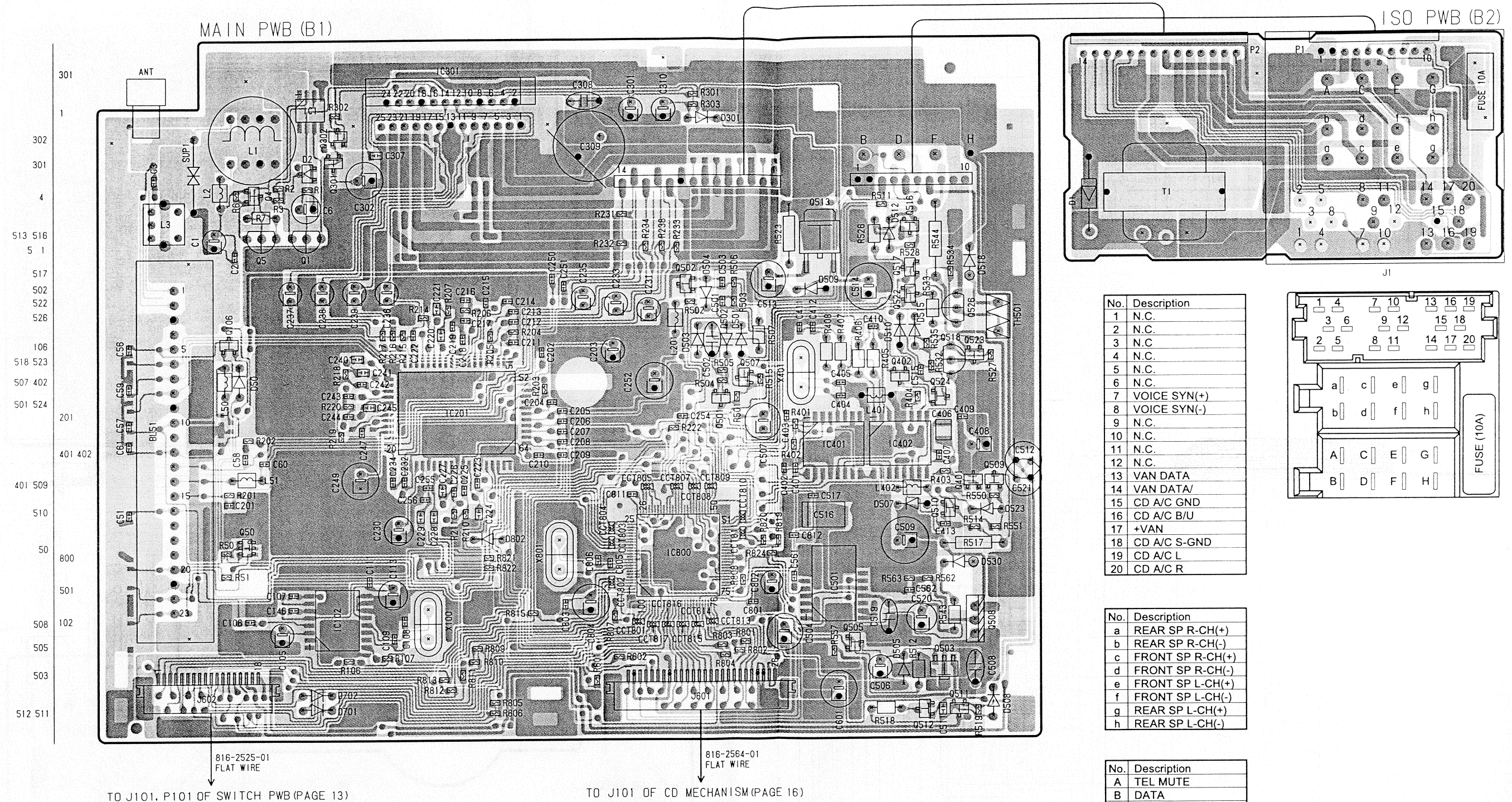


Main PWB section(B1)



PRINTED WIRING BOARD

Main PWB(B1) / ISO PWB(B2) section



MARKS ● AND MARKS [GND] ARE ON THE GROUND OF THE DIP LAYER.

CIRCUIT DIAGRAM

CD PWB(B4) / LED PWB(B5) section

PRINTED WIRING BOARD

CD PWB(B4) / LED PWB(B5) section

